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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/666,929	09/18/2003	Victor L. Andelin	P0881D	6471
23735	7590	01/21/2009	EXAMINER	
DIGIMARC CORPORATION			CERVETTI, DAVID GARCIA	
9405 SW GEMINI DRIVE			ART UNIT	PAPER NUMBER
BEAVERTON, OR 97008			2436	
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/666,929	Applicant(s) ANDELIN ET AL.
	Examiner David Garcia Cervetti	Art Unit 2436

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
 - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
 - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED. (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 21 October 2008.
- 2a) This action is FINAL. 2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1-42 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) Claim(s) _____ is/are allowed.
- 6) Claim(s) 1-42 is/are rejected.
- 7) Claim(s) _____ is/are objected to.
- 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on 18 September 2003 is/are: a) accepted or b) objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) Notice of References Cited (PTO-892)
 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)
 3) Information Disclosure Statement(s) (PTO-1668)
 Paper No(s)/Mail Date _____
- 4) Interview Summary (PTO-413)
 Paper No(s)/Mail Date _____
- 5) Notice of Informal Patent Application
 6) Other: _____

DETAILED ACTION

1. Applicant's arguments and Appeal Brief filed October 21, 2008, have been fully considered.
2. Claims 1-42 are pending and have been examined.

Response to Amendment

3. In view of the appeal brief filed on 10/21/2008, PROSECUTION IS HEREBY REOPENED. A new ground of rejection is set forth below.
4. To avoid abandonment of the application, appellant must exercise one of the following two options:
 - (1) file a reply under 37 CFR 1.111 (if this Office action is non-final) or a reply under 37 CFR 1.113 (if this Office action is final); or,
 - (2) initiate a new appeal by filing a notice of appeal under 37 CFR 41.31 followed by an appeal brief under 37 CFR 41.37. The previously paid notice of appeal fee and appeal brief fee can be applied to the new appeal. If, however, the appeal fees set forth in 37 CFR 41.20 have been increased since they were previously paid, then appellant must pay the difference between the increased fees and the amount previously paid.
5. A Supervisory Patent Examiner (SPE) has approved of reopening prosecution by signing below:

/Nasser G Moazzami/

Supervisory Patent Examiner, Art Unit 2436

Requirement for Information

6. An issue of public use or on sale activity has been raised in this application. In order for the examiner to properly consider patentability of the claimed invention under 35 U.S.C. 102(b), additional information regarding this issue is required as follows: "Digimarc's Digital Driver's License/ ID card System" and other Digimarc products related to this invention. White paper, user manual, and other relevant documents are respectfully requested.

7. Applicant is reminded that failure to fully reply to this requirement for information will result in a holding of abandonment.

Claim Rejections - 35 USC § 101

8. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

9. Claim(s) 14-32 are rejected under 35 U.S.C. 101 as not falling within one of the four statutory categories of invention. While the claims recite a series of steps or acts to be performed, a statutory "process" under 35 U.S.C. 101 must (1) be tied to particular machine, or (2) transform underlying subject matter (such as an article or material) to a different state or thing. See page 10 of In Re Bilski 88 USPQ2d 1385. The instant claims are neither positively tied to a particular machine that accomplishes the claimed method steps nor transform underlying subject matter, and therefore do not qualify as a statutory process. The "method comprising..." is broad enough that the claim could be completely performed mentally, verbally or without a machine nor is any transformation apparent. The steps call for at least paper documents with information therein and

analyzing to determine authenticity, none of which are necessarily performed by a machine, or modify any underlying subject matter.

Claim Rejections - 35 USC § 102

10. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

11. **Claims 35, 38, and 40-42 are rejected under 35 U.S.C. 102(e) as being anticipated by Wu et al. (US 6,748,533, hereinafter Wu).**

Regarding claim 35, Wu teaches a printed document comprising (abstract, passport): a document identifier (fig.1, id portion); a first digital watermark including a first payload, the first payload comprising a representation of the document identifier; a second digital watermark including a second payload, the second payload comprising at least a reduced-bit representation of the first payload (col.6, lines 35-67, information from one part of the document embedded as invisible or visible watermark on a second portion, and this data in a third portion).

Regarding claim 38, Wu teaches wherein the document comprises information printed therein, and wherein said second payload further comprises a representation of at least a portion of the printed information (col.6, lines 35-67).

Regarding claim 40, Wu teaches wherein the reduced-bit representation of the first payload comprises a hash (col.5-6).

Regarding claim 41, Wu teaches wherein the reduced-bit representation of the first payload comprises a cryptographic permutation (col.5-6).

Regarding claim 42, Wu teaches wherein the document comprises variable information printed thereon, and wherein the second digital watermark comprises at least some of the variable information, wherein the variable information varies from document to document (col.5-6).

Claim Rejections - 35 USC § 103

12. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

13. **Claims 1-6, 10-13, 22-25, and 39 are rejected under 35 U.S.C. 103(a) as being unpatentable over Wu.**

Regarding claim 1, Wu teaches an identification document comprising auxiliary data steganographically embedded therein (abstract, invisible watermark embedded in seal incorporated to document).

Wu does not expressly disclose a license plate for attachment to a motor vehicle comprising such features, however, Examiner takes Official Notice that embedding invisible watermarks was conventional and well known (Wu teaches this already). Therefore, it would have been obvious to one having ordinary skill in the art at the time

the invention was made to extend Wu's invention to other documentation since Examiner takes Official Notice that it was conventional and well known.

Regarding claim 22, Wu teaches a method to authenticate documentation associated with a person, the documentation comprises plural-bit auxiliary data steganographically embedded therein through alterations to graphics, artwork or information carried on the documentation, the auxiliary data comprising at least an identifier (abstract, passport information), said method comprising: receiving optically captured image data that corresponds to the documentation; analyzing the image data to obtain the identifier, wherein the identifier includes or links to information to uniquely identify the person; and providing a signal in response to the identifier being obtained (abstract, scan watermark to determine authenticity).

Wu does not expressly disclose documentation associated with a motor vehicle comprising such features, however, Examiner takes Official Notice that using such documentation was conventional and well known. Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to extend Wu's invention to other documentation since Examiner takes Official Notice that it was conventional and well known.

Regarding claim 2, Wu does not expressly disclose, however Examiner takes Official Notice that the use of wherein the motor vehicle comprises at least one of a car, truck, sport utility vehicle, motorcycle, trailer to be pulled by a motor vehicle, motor home, plane, golf cart, boat, tractor, bus or off-road vehicle was conventional and well known. Therefore, it would have been obvious to one having ordinary skill in the art at

the time the invention was made to extend the modified invention of Wu to other vehicles since Examiner takes Official Notice that it was conventional and well known.

Regarding claim 3, Wu teaches wherein the auxiliary data is steganographically embedded in the license plate in the form of a digital watermark (col.6, lines 35-67).

Regarding claim 4, Wu teaches wherein the digital watermark comprises an orientation component (col.6, lines 35-67).

Regarding claim 5, Wu teaches wherein the auxiliary data comprises two or more payload fields (col.6, lines 35-67).

Regarding claim 6, Wu teaches wherein at least a first of the payload fields includes first plural-bit data to uniquely identify the motor vehicle (col.6, lines 35-67).

Regarding claim 10, Wu teaches wherein at least a second of the payload fields includes second plural-bit data to be used to reference documentation associated with at least one of the motor vehicle or an owner of the vehicle (col.5-6).

Regarding claim 11, Wu teaches wherein the documentation comprises at least one of vehicle registration card, disabled placard, cargo manifest, vehicle insurance document, vehicle title, a driver's license or a trip permit (col.5-6).

Regarding claim 12, Wu teaches wherein the auxiliary data comprises an identifier to be used to interrogate a data structure, the data structure comprising information associated with the vehicle or with an owner of the vehicle (col.5-6).

Regarding claim 13, Wu teaches wherein the license plate comprises a sticker or tag, and wherein the auxiliary data is steganographically conveyed via the sticker or tag (col.5-6).

Regarding claim 23, Wu teaches wherein the identifier is intertwined with another identifier, the another identifier being steganographically embedded in different documentation, the different documentation also being associated with a motor vehicle (col.5-6).

Regarding claim 24, Wu teaches wherein the documentation comprises at least one of an emissions document or sticker, a license plate, an insurance card, disabled placard, cab or taxi documentation, a trip permit, a cargo manifest, a registration document, an inspection sticker or document, or and a motor vehicle title (col.5-6).

Regarding claim 25, Wu teaches wherein the information further comprises a listing of drivers who are authorized to operate the motor vehicle (col.5-6).

Regarding claim 39, Wu does not expressly disclose, however, Examiner takes Official Notice that imparting watermarks to the document through laser engraving was conventional and well known. Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to impart some of the watermarks in Wu's invention to through laser engraving since Examiner takes Official Notice that it was conventional and well known.

14. Claims 7-9 and 36-37 are rejected under 35 U.S.C. 103(a) as being unpatentable over Wu, and further in view of Bunn (US 6,907,528).

Regarding claims 7-9 and 36-37, Wu does not expressly disclose, however Bunn teaches wherein the document is associated with a motor vehicle / wherein the document identifier comprises a vehicle identification number (VIN) (col.3, lines 20-59). Therefore, it would have been obvious to one having ordinary skill in the art at the time

the invention was made to use Wu's teachings on the system of Bunn. One of ordinary skill in the art would have been motivated to perform such a modification to provide multiple watermarks to motor vehicle related documents (Bunn, col.3).

15. Claims 14-21 and 26-34 are rejected under 35 U.S.C. 103(a) as being unpatentable over Tresser et al. (US 2002/0073010, hereinafter Tresser), and further in view of Wu.

Regarding claims 14 and 26, Tresser teaches a method of providing authenticating information for a property title document, said method comprising (abstract):

receiving a first digital signature that is associated with a seller of property (par.16, owner's signature);

receiving a second digital signature that is associated with a buyer of the property (par.16, buyer's signature).

Tresser teaches the owner signing the title to transfer it to someone else (par.16-20) but does not expressly disclose, however, Wu teaches using the first digital signature and the second digital signature to provide a digital watermark payload, the payload comprising authenticating information; and steganographically embedding the digital watermark payload in the property title document (col.5-6).

Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to embed the owner's signature of the document including the buyer's signature (from Tresser) into the document as a watermark, as taught by Wu. One of ordinary skill in the art would have been motivated to perform

such a modification to provide means for verification of the transaction (Wu, col.6, lines 1-35).

Regarding claim 15, the combination of Tresser and Wu teaches wherein the authentication information comprises the first digital signature and the second digital signature (Wu, col.6).

Regarding claim 16, the combination of Tresser and Wu teaches wherein the authentication information comprises a cryptographic permutation of at least one of the first digital signature or the second digital signature (Wu, col.5-6).

Regarding claim 17, the combination of Tresser and Wu teaches wherein the authentication information comprises an output of a function which includes the first digital signature and the second digital signature as inputs (Wu, col.6-7).

Regarding claim 18, the combination of Tresser and Wu teaches wherein at least one of the authentication information, first digital signature and second digital signature comprises a time or date stamp (Wu, col.7-8, Tresser, par.26-28).

Regarding claim 19, the combination of Tresser and Wu teaches wherein the property comprises at least one of a motor vehicle, personal property or real property (Tresser, par.16-20, 33-41, Wu, col.7-8).

Regarding claim 20, the combination of Tresser and Wu teaches wherein the authentication information comprises a reduced-bit representation of at least one of the first digital signature or the second digital signature (Wu, col.7-8).

Regarding claim 21, the combination of Tresser and Wu teaches wherein the property title document comprises at least one of an electronic document or a printed document (Wu, col.7-8).

Regarding claim 27, the combination of Tresser and Wu teaches accessing the first data record (Tresser, par.16-17, Wu, col.7-8).

Regarding claim 28, the combination of Tresser and Wu teaches wherein the first data record and the second data record are associated via the identifier (Tresser, par.16-17, Wu, col.7-8).

Regarding claim 29, the combination of Tresser and Wu teaches presenting at least some of the information that is associated with the motor vehicle or the seller of the motor vehicle to the buyer through a computer interface (Tresser, par.16-17).

Regarding claim 30, the combination of Tresser and Wu teaches prompting the buyer to confirm the transfer through the computer interface (Tresser, par.16-17).

Regarding claims 31-32, the combination of Tresser and Wu does not expressly disclose, however, Examiner takes Official Notice that notifying at least a government agency after the buyer confirms the transfer, wherein the motor vehicle is purchased through an auction was conventional and well known, and to further do so automatically would have been obvious to someone of ordinary skill in the art. Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to extend the modified invention of Wu to other vehicles since Examiner takes Official Notice that it was conventional and well known.

Regarding claim 33, the combination of Tresser and Wu teaches wherein the information associated with the buyer comprises an account number, said method further comprising automatically debiting the account after the buyer confirms the transfer (Tresser, par.16-17, Wu, col.7-8).

Regarding claim 34, the combination of Tresser and Wu teaches generating a printed title document after the buyer confirms the transfer (Tresser, par.16-17, Wu, col.7-8).

Conclusion

16. Any inquiry concerning this communication or earlier communications from the examiner should be directed to David García Cervetti whose telephone number is (571)272-5861. The examiner can normally be reached on Monday-Tuesday and Thursday-Friday.
17. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Nasser Moazzami can be reached on (571)272-4195. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.
18. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/David García Cervetti/
Primary Examiner, Art Unit 2436